

I strenuously object to the Broadcast Flag (FCC NPRM 02-230 "Broadcast Flag") proposal being promulgated by narrow interests from Hollywood, that would limit how I use my computer to send and receive digital broadcasts. Digital TV does not need government technology mandates. Period. Let the market and individual innovation decide what formats are acceptable for the public. The BPDG Standard will frustrate the legitimate fair use expectations of the public. Today, a father who spots his son in the local news college sports highlights can use a VHS video cassette to send the video to his mother, or can attach the video clip to an email message. The BPDG Standard would make this impossible.

The Standard will also stunt the future evolution of fair use. Under the Standard, technology innovators will not be able to introduce new DTV technologies unless they first implement one of the •Hollywood-approved• protection schemes (see •Table A• in the Standard).

The upshot is simple: unlike in every other area of digital media technology, in the DTV arena new fair uses will be contingent on the prior consent of Hollywood. This turns fair use on its head, substituting the self-interested judgments of Hollywood executives for the open marketplace and wisdom of federal judges. If this had been the rule in 1976, when Hollywood movie studios sued to ban the Betamax VCR, the Supreme Court would never have been able to add •time-shifting• to the lexicon of fair uses.

The BPDG Standard restricts DTV innovation by limiting technology companies to a selected list of •approved• technologies (see •Table A• in the Standard). In effect, the BPDG Standard tells DTV technologists that •innovation will only be tolerated only inside the lines we've drawn for you.• The BPDG Standard thus limits the horizons of tomorrow's DTV innovators, substituting government mandates developed by self-interested incumbent companies for marketplace incentives.

•Inter-industry negotiations• like BPDG promote the corporate interests of negotiation participants, not the public interest. Technology mandates pick winning technologies in advance, substituting •inter-industry• negotiations for market competition.

The threat to competition is further compounded when the mandated technologies are picked by a group of interested companies.

It should come as no surprise that the chief BPDG participants happen to have proprietary interests in BPDG's list of •approved• technologies, while the technologies of their competitors (including future innovators) have been excluded.

The BPDG Standard effectively bans free and open source software from interoperating with DTV signals. This is accomplished by mandating •Robustness• requirements that require DTV devices to resist user modification (•tamper-resistant• is the euphemism). This is anathema to the free and open source software, which requires that software be delivered in •tamper-friendly• formats, and is predominantly written by hobbyists and tinkerers. The BPDG Standard is akin to a government mandate that all cars be sold with their hoods welded shut, lest their mechanically-minded owners •tamper• with them.

In a technology marketplace increasingly dominated by a few companies (including one adjudged a monopolist by the courts), free and open source software has been a powerful force for competition and innovation, having been embraced by

companies as diverse as IBM, Hewlett Packard, Sun Microsystems, TiVo and Apple Computer. New free software projects such as GNU Radio and DScaler are already working on DTV applications. If the BPDG Standard becomes law, however, the public will never see the fruits of these efforts, even though devices built on free software could substantially lower the consumer cost of making the transition to DTV.

Each of the flaws detailed above•curtailing fair use, retarding innovation, undermining competition, banning free/open source software•will serve to delay DTV adoption in the marketplace.

The public wants from DTV technology vendors what it wants from all technology products•ever more features at ever lower costs. That is precisely what they have received from computer technology, an industry marked by robust innovation and market competition, not government mandates.

As for content, if Hollywood refuses to license its movies for DTV, there are others who are willing to make the most of Hollywood's short-sightedness. Already, Mark Cuban's HDNet is creating compelling HDTV content, and NBC has begun digital broadcasting its prime time programs in HD format.

It is particularly ironic that the BPDG Standard, while damaging the important public interests noted above, does virtually nothing to address the unauthorized redistribution of programming on the Internet. Today, the unauthorized programming available on the Internet is drawn from analog TV broadcasts and DVDs. That is not likely to change with the advent of DTV. Due to limitations of broadband deployment to the home, video programming on the Internet is compressed (•down-sampled•) into lower quality in order to facilitate downloading. Thus, those redistributing programming over the Internet are unlikely to find much attractive about DTV, since any increase in quality would be lost by the necessity of compression. Incumbent entertainment industries have fought virtually every new technology for over a century. Government technology mandates, however, have almost never been the answer. (The one exception was the SCMS mandate on DAT recorders; the failure of DAT has been ascri-

bed by many to the mandate.) DTV technology is still in its infancy; hobbling it with government mandates like the BPDG Standard is both unwise and unprecedented.

Hollywood and content producers must not be allowed to determine the rights of the public to use flexible information technology. The idea of the broadcast flag is to implement universal content control and abolish the right of free citizens to own effective tools for employing digital content in useful ways. The broadcast flag is theft.

In the ongoing fight with old world content industries, the most essential rights and interests in a free society are those of the public. Free citizens are not mere consumers; they are not a separate group from so-called "professionals." The stakeholders in a truly just information policy in a free society are the public, not those who would reserve special rights to control public uses of information technology.

Thank you for your consideration.